



ENVIRONMENTAL PROTECTION AGENCY

40 CFR Part 300

[EPA-HQ-SFUND-1983-0002; FRL-9839-6]

National Oil and Hazardous Substances Pollution Contingency Plan;

National Priorities List: Deletion of the Cannon Engineering Corp. Superfund Site

**AGENCY:** Environmental Protection Agency (EPA).

**ACTION:** Direct final rule.

**SUMMARY:** The Environmental Protection Agency (EPA) Region 1 is publishing a direct final Notice of Deletion of the Cannon Engineering Corp. (CEC), Superfund (Site), located in Bridgewater, Massachusetts, from the National Priorities List (NPL). The NPL, promulgated pursuant to section 105 of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) of 1980, as amended, is an appendix of the National Oil and Hazardous Substances Pollution Contingency Plan (NCP). This direct final deletion is being published by EPA with the concurrence of the State of Massachusetts, through the Massachusetts Department of Environmental Protection (MassDEP), because EPA has determined that all appropriate response actions under CERCLA, have been completed. However, this deletion does not preclude future actions under Superfund.

**DATES:** This direct final deletion is effective [insert date 60 days from the date of publication in the *Federal Register*] unless EPA receives adverse comments by [insert date 30 days from date of publication in the *Federal Register*]. If adverse comments are received, EPA will publish a timely withdrawal of the direct final deletion in the *Federal Register* informing the public that the deletion will not take effect.

**ADDRESSES:** Submit your comments, identified by Docket ID no. EPA-HQ-SFUND-1983-0002, by one of the following methods:

- <http://www.regulations.gov> . Follow on-line instructions for submitting comments.
- Email: [golden.derrick@epa.gov](mailto:golden.derrick@epa.gov) or [brown.rudy@epa.gov](mailto:brown.rudy@epa.gov)
- Fax: 617-918-0448 or 617-918-0031
- Mail: Derrick Golden, EPA Region 1 - New England, 5 Post Office Square, Suite 100, Mail Code OSRR07-4, Boston, MA 02109-3912 or Rudy Brown, EPA Region 1 - New England, 5 Post Office Square, Suite 100, Mail Code ORAO1-1, Boston, MA 02109-3912
- Hand delivery: Derrick Golden, EPA Region 1 - New England, 5 Post Office Square, Suite 100, Mail Code OSRR07-4, Boston, MA 02109-3912 or Rudy Brown, EPA Region 1 - New England, 5 Post Office Square, Suite 100, Mail Code ORAO1-1, Boston, MA 02109-3912. Such deliveries are only accepted during the Docket's normal hours of operation (9:00 am to 5:00 pm), and special arrangements should be made for deliveries of boxed information.

*Instructions:* Direct your comments to Docket ID no. EPA-HQ-SFUND-1983-0002.

EPA's policy is that all comments received will be included in the public docket without change and may be made available online at <http://www.regulations.gov>, including any personal information provided, unless the comment includes information claimed to be Confidential Business Information (CBI) or other information whose disclosure is restricted by statute. Do not submit information that you consider to be CBI or otherwise protected through <http://www.regulations.gov> or

e-mail. The <http://www.regulations.gov> Web site is an “anonymous access” system, which means EPA will not know your identity or contact information unless you provide it in the body of your comment. If you send an e-mail comment directly to EPA without going through <http://www.regulations.gov>, your e-mail address will be automatically captured and included as part of the comment that is placed in the public docket and made available on the Internet. If you submit an electronic comment, EPA recommends that you include your name and other contact information in the body of your comment and with any disk or CD-ROM you submit. If EPA cannot read your comment due to technical difficulties and cannot contact you for clarification, EPA may not be able to consider your comment. Electronic files should avoid the use of special characters, any form of encryption, and be free of any defects or viruses.

*Docket:* All documents in the docket are listed in the <http://www.regulations.gov> index. Although listed in the index, some information is not publicly available, e.g., CBI or other information whose disclosure is restricted by statute. Certain other material, such as copyrighted material, will be publicly available only in the hard copy. Publicly available docket materials are available either electronically in <http://www.regulations.gov> or in hard copy at:

U.S. Environmental Protection Agency  
Records Center  
5 Post Office Square, Suite 100  
Boston, MA 02109  
617-918-1440  
Monday-Friday: 9:00 am - 5:00 pm  
Saturday and Sunday – Closed  
and

Bridgewater Public Library  
15 South Street  
Bridgewater, MA 02324  
508-697-3331  
Monday-Wednesday: 9:00 am – 8:00 pm  
Thursday: 10:00 am – 5:00 pm  
Friday: 10:00 am – 2:00 pm  
Saturday: 10:00 am – 2:00 pm  
Sunday: Closed

**FOR FURTHER INFORMATION CONTACT:** Derrick Golden, Remedial Project Manager, U.S. Environmental Protection Agency, Region 1 New England, 5 Post Office Square, Mail code OSRR07-4, Boston, MA 02109-3912, (617) 918-1448, [email: golden.derrick@epa.gov](mailto:golden.derrick@epa.gov).

**SUPPLEMENTARY INFORMATION:**

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**I. Introduction**

EPA Region 1 is publishing this direct final Notice of Deletion of the Cannon Engineering Corp. (CEC) Superfund (Site), from the National Priorities List (NPL). The NPL constitutes Appendix B of 40 CFR part 300, which is the Oil and Hazardous Substances Pollution Contingency Plan (NCP), which EPA promulgated pursuant to section 105 of the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) of 1980, as amended. EPA maintains the NPL as the list of sites that appear to present a significant risk to public health, welfare, or the

environment. Sites on the NPL may be the subject of remedial actions financed by the Hazardous Substance Superfund (Fund). As described in 300.425(e) (3) of the NCP, sites deleted from the NPL remain eligible for Fund-financed remedial actions if future conditions warrant such actions.

Because EPA considers this action to be noncontroversial and routine, this action will be effective [insert date 60 days from the date of publication in the *Federal Register*] unless EPA receives adverse comments by [insert date 30 days after this publication in the *Federal Register*]. Along with this direct final Notice of Deletion, EPA is co-publishing a Notice of Intent to Delete in the “Proposed Rules” section of the Federal Register. If adverse comments are received within the 30-day public comment period on this deletion action, EPA will publish a timely withdrawal of this direct final Notice of Deletion before the effective date of the deletion, and the deletion will not take effect. EPA will, as appropriate, prepare a response to comments and continue with the deletion process on the basis of the Notice of Intent to Delete and the comments already received. There will be no additional opportunity to comment.

Section II of this document explains the criteria for deleting sites from the NPL. Section III discusses procedures that EPA is using for this action. Section IV discusses the Cannon Engineering Corp. (CEC) Superfund Site and demonstrates how it meets the deletion criteria. Section V discusses EPA’s action to delete the Site from the NPL unless adverse comments are received during the public comment period.

## **II. NPL Deletion Criteria**

The NCP establishes the criteria that EPA uses to delete sites from the NPL. In accordance with 40 CFR 300.425(e), sites may be deleted from the NPL where no further response is appropriate. In making such a determination pursuant to 40 CFR 300.425(e), EPA will consider, in consultation with the state, whether any of the following criteria have been met:

- i. responsible parties or other persons have implemented all appropriate response actions required;
- ii. all appropriate Fund-financed response under CERCLA has been implemented, and no further response action by responsible parties is appropriate; or
- iii. the remedial investigation has shown that the release poses no significant threat to public health or the environment and, therefore, the taking of remedial measures is not appropriate.

Pursuant to CERCLA section 121 (c) and the NCP, EPA conducts five-year reviews to ensure the continued protectiveness of remedial actions where hazardous substances, pollutants, or contaminants remain at a site above levels that allow for unlimited use and unrestricted exposure. EPA conducts such five-year reviews even if a site is deleted from the NPL. EPA may initiate further action to ensure continued protectiveness at a deleted site if new information becomes available that indicates it is appropriate. Whenever there is a significant release from a site deleted from the NPL, the deleted site may be restored to the NPL without application of the hazard ranking system.

### **III. Deletion Procedures**

The following procedures apply to deletion of the Site:

- (1) EPA consulted with the state of Massachusetts prior to developing this direct final Notice of Deletion and the Notice of Intent to Delete co-published today in the “Proposed Rules” section of the Federal Register.
- (2) EPA has provided the state 30 working days for review of this notice and the parallel Notice of Intent to Delete prior to their publication today, and the state, through the Massachusetts Department of Environmental Protection (MassDEP), has concurred on the deletion of the Site from the NPL.
- (3) Concurrently with the publication of this direct final Notice of Deletion, a notice of the availability of the parallel Notice of Intent to Delete is being published in a major local newspaper, the Bridgewater Independent. The newspaper notice announces the 30-day public comment period concerning the Notice of Intent to Delete the Site from the NPL.
- (4) The EPA placed copies of documents supporting the proposed deletion in the deletion docket and made these items available for public inspection and copying at the Site information repositories identified above.
- (5) If adverse comments are received within the 30-day public comment period on this deletion action, EPA will publish a timely notice of withdrawal of this direct final Notice of Deletion before its effective date and will prepare a response to comments and continue with the deletion process on the basis of the Notice of Intent to Delete and the comments already received.

Deletion of a site from the NPL does not itself create, alter, or revoke any individual's rights or obligations. Deletion of a site from the NPL does not in any way alter EPA's right to take enforcement actions, as appropriate. The NPL is designed primarily for informational purposes and to assist EPA management. Section 300.425(e)(3) of the NCP states that the deletion of a site from the NPL does not preclude eligibility for future response actions, should future conditions warrant such actions.

#### **IV. Basis for Site Deletion**

The following information provides EPA's rationale for deleting the Site from the NPL:

##### **Site Background and History**

The Cannon Engineering Corp. Superfund site (CEC), CERCLIS ID No. MAD079510780, is a 7-acre area of land and is located in a small industrial park in the western part of the Town of Bridgewater, Massachusetts. The site is located approximately 31 miles south from the city of Boston Massachusetts. Prior to 1969, the industrial park consisted of a wooded lowland bordered to the north, south, and east by rural agricultural land. Current land use around the site consists of industrial development in the immediate vicinity to the north and east, and a wooded lowland to the south and west, and agricultural and residential development in the outlying areas.

The CEC facility is one of the four separate but related sites which form the Cannons Site Group. The others are Cannons Plymouth Harbor located in Plymouth, Massachusetts; Tinkham's Garage in Londonderry, New Hampshire;



and Gilson Road in Nashua, New Hampshire. All four sites are being handled under one enforcement effort.

CEC first purchased the parcel of land at the Site in November, 1974. The property was developed by them to handle, store, and incinerate chemical wastes. These activities occurred frequently at the Site between 1974 and November, 1980 when operations at the Site ceased after the MassDEP (then called the Department of Environmental Quality Engineering) revoked CEC's Waste License, citing document falsification and other waste reporting violations.

Over 700 drums and approximately 155,000 gallons of liquid waste and sludge in bulk storage were left behind on-site by CEC. Between 1980 and 1982, MassDEP and EPA conducted Site inspections, performed sampling and analyses and confirmed the presence of chemical contamination at the Site. Several tanks and drums were also observed to be leaking. In order to alleviate the problem of leaking contamination and wastes left on-site, the MassDEP performed a removal action. In October 1982, MADEP's contractor, Jet Line Services, Inc., removed approximately 155,000 gallons of sludge and liquid wastes that were stored in tanks and approximately 711 drums from the Site. A subsequent removal was conducted by the group of Potentially Responsible Parties (the "PRP Group") in June 1988. The PRP Group removed the bulk contents of an underground tank, a septic tank, 3 tanker trailers and small (5 gallon or less) containers from laboratory and storage areas at the Site.

In December of 1982, the Site was proposed for inclusion on the NPL, (49 FR 40320) and the site was made final to the NPL on September 8, 1983, (51 FR 21054).

The property was redeveloped in November of 1996, when Osterman Propane, Inc., relocated its propane storage and distribution operations to the Site.

### **Remedial Investigation**

The RI/FS was completed in May of 1987 and evaluated contamination present in air, soils, sediment, surface water and groundwater. Past operations of the facilities at the CEC Site have resulted in the contamination of localized areas of soil, sediments, surface water, and groundwater by chemical wastes.

The findings of the RI/FS determined the following: 1.) Soils, ranging from 4 inches to 22 feet below ground surface, were contaminated with volatile organic compounds (VOCs), semi-organic compounds (SVOCs), polychlorinated biphenyls (PCBs) and pesticides. 2.) Ambient air sampling detected the presence of VOCs. 3.) Groundwater sampling indicated the presence of VOCs, SVOCs and no PCBs nor pesticides. 4.) Sediment sampling results indicated the presence of VOCs, SVOCs and no PCBs and no pesticides. 5.) Surface water sampling results indicated the presence of VOCs, SVOCs and no PCBs nor pesticides. For specific details see the report entitled: *Final Report, Remedial Investigation, Cannons Engineering Corporation Site, Bridgewater, Massachusetts, May 1987.*

## **The Selected Remedy**

In March of 1988, EPA issued a Record of Decision (ROD) for the cleanup of the Site.

The cleanup actions were divided into two operable units. The major components of the cleanup remedies for the site included:

1. Management of Migration (MOM)

The MOM portion of the remedy included a twenty year groundwater monitoring program to assure that contamination above the Maximum Contaminant Levels (MCLs) did not migrate off-site, and to also assure that contaminant levels on-site naturally attenuated. The 1988 ROD estimated that groundwater cleanup target levels, based on the ingestion of on-site groundwater, would be achieved within 15 to 20 years. The Year 20 groundwater sampling event was completed in September of 2010. The management of migration remedy also required that institutional controls be placed on the property to restrict the use of groundwater at the Site. The institutional controls were implemented in 1991 in the form of a deed restriction on the properties.

2. Source Control

In summary, the source control portion of the remedy provided for fencing the entire Site to restrict access, onsite thermal aeration of soils contaminated with volatile organic compounds (VOCs) and treatment of PCB contaminated soils offsite by incineration.

In addition, onsite buildings and tanks were decontaminated and removed, and soils under those structures were sampled, along with other soil locations. Any contaminated soils that posed a threat to human health and the environment, were remediated via one of the above mentioned thermal treatment technologies.

All remedial actions, construction activities and cleanup levels related to the Source Control Operable Unit were completed and achieved. Therefore, on September 30, 1991, EPA prepared an Interim Close-out Report (ICOR) for the Site and it is included into the Administrative Record.

The remedial action objectives, as set forth in the 1988 ROD, identified to mitigate threats to public health are as follows:

- prevent direct contact with contaminated soils throughout the site
- prevent ingestion of contaminated soils, standing water in the wet area
- prevent ingestion of contaminated groundwater
- prevent exposure to contaminants in the buildings, aboveground and underground tanks, and associated structures

The remedial action objectives identified to mitigate threats to the environment are as follows:

- prevent the exposure of wildlife to contaminated soil, sediments, and standing water in the wet area
- prevent future wetlands contamination from surface water runoff and discharge

There are no ROD amendments for the Site; however an Explanation of Significant Differences (ESD) was signed in May of 2013. The ESD was issued to explain a modification to the selected cleanup levels for the MOM portion of the remedy, as set forth in the March 31, 1988, ROD for the Site. The MOM groundwater remedy was selected in 1988, before the 1993 revisions to the Massachusetts Contingency Plan (MCP). The MCP is the clean up regulations for the Massachusetts Department of Environmental Protection (MassDEP). Prior to 1993, the MCP classified all groundwater within the Commonwealth as a Class 1, or a potable aquifer. Therefore in the 1988 ROD the ingestion of groundwater was assumed to be a potential exposure pathway and Maximum Contaminant Levels (MCLs) were applicable. However, in 1993, MassDEP revised the MCP, which now established new groundwater categories for purpose of remediating waste sites. MassDEP conducted a reevaluation of site groundwater in the fall of 2012 and determined that the site is no longer located in a Class 1 or a potable aquifer. Because the ingestion of site groundwater is no longer considered a potential exposure pathway, MCL's are no longer applicable nor appropriate for cleanup goals at the Site.

Due to the reclassification of groundwater use at the Site, in March of 2012, EPA's risk assessor conducted a cumulative human health and ecological risk assessment. This assessment was performed on all of the remaining contaminated groundwater using the annual groundwater data from 2009, 2010 and 2011. The conclusions of the cumulative risk assessment determined that there is no unacceptable human health risks because

there is no foreseeable use of this groundwater for drinking water purposes at the site.

The EPA risk assessment memo is included as attachment 2 to the May 2013 ESD, which is included in the Administrative Record for the Site.

Furthermore because the MOM and SC remedial actions are complete and both human health and ecological risks are within EPA's acceptable range, EPA prepared a Final Close Out Report (FCOR), dated June 2013. The FCOR is included in the administrative record and deletion docket for the site and a copy was also sent to the Bridgewater public library.

### **Response Actions**

As required in the ROD, fencing of the perimeter to restrict uncontrolled access was completed in December 1988. As part of the Remedial Design, an asbestos inspection was performed and asbestos containing materials (ACMs) were found in several of the former onsite buildings. The proper removal and offsite disposal of all ACMs was completed in the spring of 1990. Decontamination, demolition and disposal of all on-site structures, including buildings, storage tanks, piping and an electrical transformer, was completed in February of 1990.

Approximately 397 tons of PCB contaminated soils were excavated transported and properly incinerated offsite. Post-excavation confirmatory samples verified that PCB concentrations in the remaining soils were below the 9 ppm cleanup level. The PCB soil excavations were backfilled with a clean fill and this action was completed in August of 1990.

Between June 11, 1990 and October 10, 1990, a total of 11,330 tons of VOC contaminated soils were excavated and thermally aerated on-site using the Low Temperature Thermal Aeration Unit (LTTA). Post-excavation confirmatory sampling verified that VOC contaminated soil removal to the remedial design excavation levels was achieved. The VOC treated soils were replaced on site and used as part of the fill material in the excavations.

The MOM component of the remedy included the installation of 6 new overburden monitoring wells and 3 new bedrock monitoring wells for the long term monitoring of groundwater quality. Long term groundwater, surface water, sediment and seep monitoring began in 1990 and were completed in September of 2010.

The final field activities involved Site restoration that included wetland restoration of 35,000 square feet of wetlands and then topsoil material was added and then re-graded and seeded. The entire upland area, approximately 99,000 square feet, was backfilled with the treated VOC and SVOC soils and was also re-graded and seeded. Drainage and erosion controls were implemented as part of the final Site restoration activities. All remedial action activities were complete by July of 1991, when the roll-off containers were removed from the Site and all of the final grading, seeding, and landscaping activities were completed.

## **Cleanup Goals**

The soil and groundwater cleanup levels were established in part, from utilizing an Organic Leaching Model, as well as expressions for partitioning and retardation of contaminant movement relative to groundwater. The cleanup levels were set to be within EPA's acceptable risk range of  $1 \times 10^{-4}$  to  $1 \times 10^{-6}$  and additional details may be found in the Remedial Action Report for the Site, dated October 1991.

Overall, a total of 11,330 tons of VOC and SVOC impacted soils were excavated and thermally aerated onsite and 396.65 tons of PCB impacted soils were excavated and incinerated off-site. These removal quantities were sufficient to satisfy the specified clean-up levels as verified by the confirmatory sampling programs and is documented in the September 1991 Interim Final Closeout Report, EPA.

## **Operation and Maintenance**

Long Term groundwater, sediment, surface water and seep sampling was conducted at the site for twenty years, per the 1988 ROD. These sampling efforts were completed in September of 2010. EPA will continue to conduct future Five Year Reviews at the site to ensure the remedies remain protective of both human health and the environment. The PRP Group shall adhere to and maintain compliance with the institutional controls/deed restrictions for the Site. At some point in the future, the PRP Group may need to properly abandon the groundwater monitoring wells as directed by EPA, with MassDEP concurrence.



Institutional Controls (ICs), in the form of a deed restriction, was placed on the properties which comprise the Site. The ICs state the following:

- The Site is restricted to certain types of municipal or town uses, until EPA and MassDEP provide certification that other uses are permissible, i.e., no residential use.
- No excavation is allowed from below the level of the groundwater table, until EPA and MassDEP provide certification otherwise.
- No groundwater may be extracted from any point on the site nor shall it serve as a drinking water supply or be used for any other purpose until EPA and MassDEP provide certification otherwise.

These ICs were placed on the Site in 1991 and were recorded and filed with the Plymouth Massachusetts Registry of Deeds. The ICs currently remain in place and were verified in the 2010 Five Year Review.

### **Five-Year Reviews**

Five Year Reviews have been completed for the Site in 1995, 2000, 2005, and 2010.

All of these Five Year Review determined that:

- The source control remedy, as documented by EPA, was complete in 1991, and judged by EPA to still be protective
- The groundwater remedy for the Cannon Engineering Corp. Site is expected to be protective of human health and the environment upon completion, and in the

interim, exposure pathways that could result in unacceptable risks are being controlled through institutional controls.

The next Five Year Review will be completed in 2015.

### **Community Involvement**

In 1982, EPA released a community relations plan which kept the local citizens group and other interested parties informed through activities such as informational meetings, community updates, press releases and public meetings. A hard copy of the 2010 Five Year Review was provided to the Bridgewater Town Clerk and Health Agent. A notice announcing the Five Year Review was placed in a local newspaper of general circulation. A notice announcing EPA's intent to delete the site from the NPL was placed in a local newspaper, the Bridgewater Independent.

### **Determination that the Site Meets the Criteria for Deletion in the NCP**

The implemented remedy achieves the degree of cleanup specified in the ROD for all pathways of exposure. All selected remedial action objectives and clean-up levels are consistent with agency policy and guidance. No further Superfund responses are needed to protect human health and the environment at the Site.

The National Contingency Plan (NCP) specifies that EPA may delete a site from the NPL if "all appropriate responsible parties or other persons have implemented all appropriate response actions required" or "all appropriate fund financed response under CERCLA has been implemented and no further response action by responsible parties is appropriate". EPA, with the concurrence of the Commonwealth of Massachusetts through the MassDEP by a letter dated May 22, 2013, believes these criteria for deletion have

been satisfied. Therefore EPA is proposing the deletion of the Site from the NPL. All of the completion requirements for the Site have been met as described in the Cannons Engineering Final Closeout Report (FCOR), dated June 2013.

## **V. Deletion Action**

The EPA, with concurrence of the Commonwealth of Massachusetts through the MassDEP, has determined that all appropriate response actions under CERCLA, other than Five Year Reviews have been completed. Therefore, EPA is deleting the Site from the NPL.

Because EPA considers this action to be noncontroversial and routine, EPA is taking it without prior publication. This action will be effective [insert date 60 days from the date of publication in the *Federal Register*] unless EPA receives adverse comments by [insert date within 30 days of this publication in the *Federal Register*]. If adverse comments are received within the 30-day public comment period, EPA will publish a timely withdrawal of this direct final notice of deletion before the effective date of the deletion, and it will not take effect. EPA will prepare a response to comments and continue with the deletion process on the basis of the notice of intent to delete and the comments already received. There will be no additional opportunity to comment.

### **List of Subjects in 40 CFR Part 300**

Environmental protection, Air pollution control, Chemicals, Hazardous waste, Hazardous substances, Intergovernmental relations, Penalties, Reporting and recordkeeping requirements, Superfund, Water pollution control, Water supply.

Dated: July 18, 2013.

H. Curtis Spalding,  
Regional Administrator,  
EPA Region 1 - New England.

For the reasons set out in this document, 40 CFR part 300 is amended as follows:

#### **PART 300—NATIONAL OIL AND HAZARDOUS SUBSTANCES POLLUTION CONTINGENCY PLAN**

1. The authority citation for part 300 continues to read as follows:

Authority: 33 U.S.C. 1321(c)(2); 42 U.S.C. 9601-9657; E.O. 12777, 56 FR 54757, 3 CFR, 1991 Comp., p. 351; E.O. 12580, 52 FR 2923; 3 CFR, 1987 Comp., p. 193.

2. Table 1 of Appendix B to part 300 is amended by removing "Cannon Engineering Corp. (CEC)", "Bridgewater", "MA".

[FR Doc. 2013-18049 Filed 07/25/2013 at 8:45 am; Publication Date: 07/26/2013]